

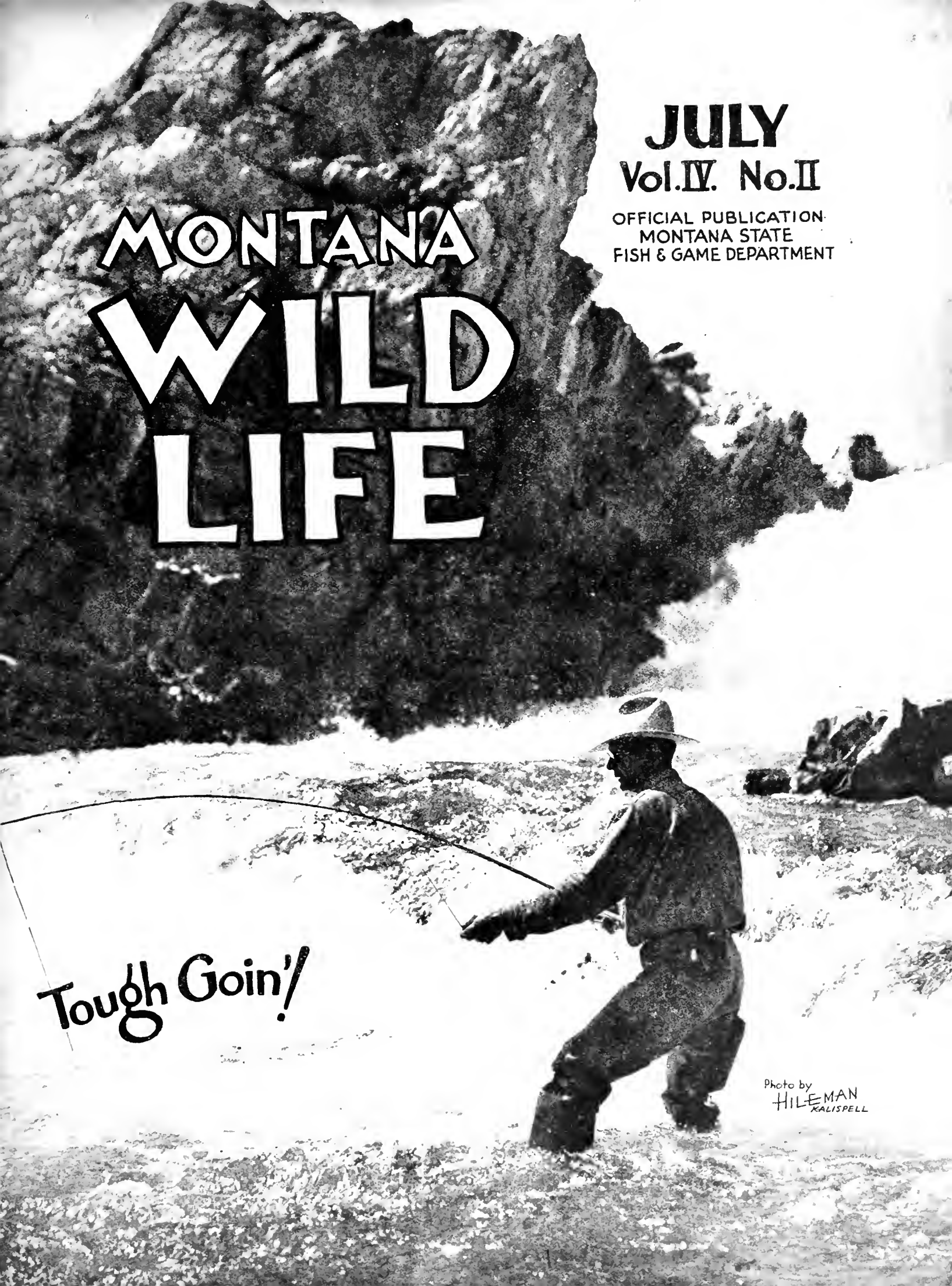
**JULY**  
**Vol.IV. No.II**

OFFICIAL PUBLICATION  
MONTANA STATE  
FISH & GAME DEPARTMENT

# MONTANA WILD LIFE

*Tough Goin'!*

Photo by  
HILEMAN  
KALISPELL

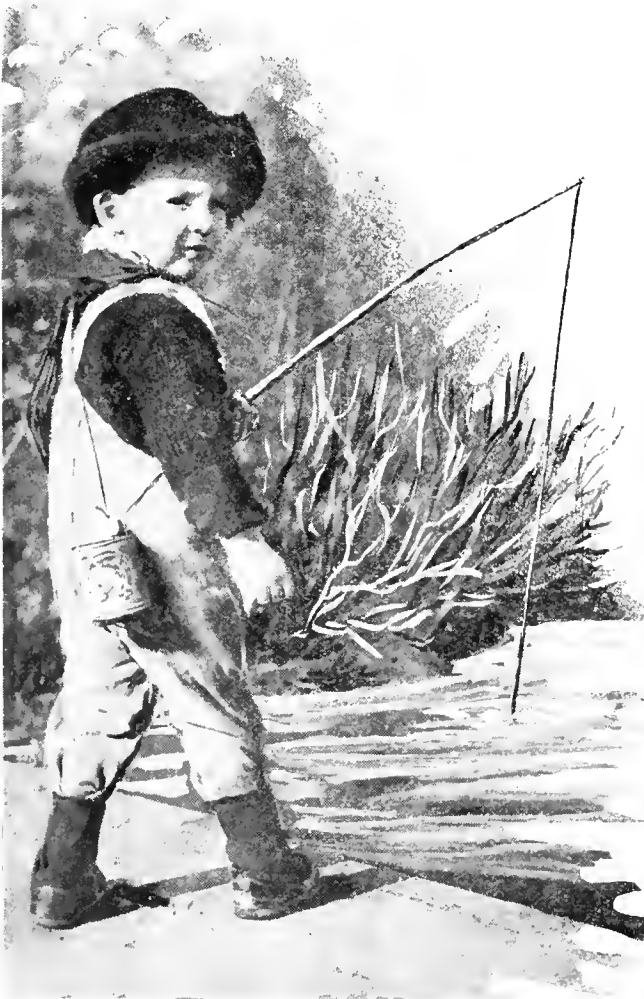


# *Lines to a Montana Lad*

By FLOYD L. SMITH.

**L**ITTLE lad with cheeks of tan, willow pole and battered can,  
Dangling worms on bent pin hook, into depths of babbling brook,  
Basking under smiling skies, 'midst the buzz of salmon flies,  
Laughing eyes reflect God's plan, for the future and the man.

**L**IKE unto his watchful Dad,  
Joys of fishing lure the Lad,  
And when Dad sets ideals high,  
Sonny forms 'the binding tie.  
Woods and waters, pals they roam,  
Students both of Nature's own.  
Minds and men are moulded there,  
Free from taint of carnal air.



**U**NDER canopies of green,  
'Mongst the bowers where birds  
preen,  
Sonny follows in the trail,  
Blazed by hands that never fail.  
And when Daddy sets the pace,  
Son is quickened in the race.  
Sportsmen worthy of the name,  
Keen to save the fish and game.

**D**AD, the sportsman, guides the  
boy,  
Teaching him the outdoor joy,  
Schools him in clean ways to win,  
Causing hearts to beat akin.  
Treasures of the Treasure State  
Are surpassed by thoughts elate,  
And they pause at Bryant's shrine,  
Mindful of his wholesome line:

## TO A WATER FOWL

"He who from zone to zone  
Guides through the boundless air  
thy certain flight,  
In the long way that I must tread  
alone,  
Will lead my steps aright."

Vincent E. Wilham, Jr., of Helena, when at the age of 6,  
casting for big ones in Clancy creek.

# MONTANA WILD LIFE

The Official Publication of The State Fish and Game Commission

VOL. IV

HELENA, MONTANA, JULY, 1931

No. 2

## Trapshooters Gather at Billings In July



S. G. Tonkin  
President

TRAPSHOOTING enthusiasts of Montana and sister states will gather for the annual championship events of the Montana Sportsmen's Association at Billings, July 17, 18, and 19, and if the prevailing indications may be taken as a criterion, the state shoot will be one of the most successful in the history of the event. Extensive preparations have been completed by the Billings Rod and Gun Club for the staging of the three-day program which centers around their new home where about \$10,000 has been expended. Trapshooting enthusiasts are listed among the keenest and squarest sportsmen of the state and nation. It's a game where cheating and violation of the ethics of sportsmen are taboo.

Under the leadership of President S. Garfield Tonkin, well known Montana sportsman, members of the Billings club are ready to act as hosts to shooters from the east and west. Assisting President Tonkin, other officers are: Charles O. Campbell, vice president; Theodore W. Johnson, secretary, and Mayor Arthur Trenerry, treasurer. Other directors are John B. Coppo, George Selvidge, and Richard A. (Dick) Prater.

Jack Keenan, staff writer of The Billings Gazette, recently prepared a keenly interesting review of activities of the Billings club, and its splendid new quarters. Much of the material utilized in this article has been taken from Mr. Keenan's review.

When the club was first formed the traps were out near Mountview cemetery. There was no shelter and in bad weather none but the boldest challenged the clays. Homes began to spring up shortly and before long the club moved to the north.

Again harried by the encroachment of Billings home owners who complained that their Sunday morning naps were ruined by the rat-tat-tat of gunfire, the club decided to solve the problem in one move, and forthwith transferred its traps to a grounds near the Midland Empire fair buildings.

Two years ago George W. Swords, long prominently connected with the

program of the club, donated a tract adjoining Boothill cemetery.

Here, within a stone's throw of the famous old burial ground, and on a slightly higher knoll, the clubhouse stands. From its southern windows one may gaze down on the winding Yellowstone river and if memory is long enough, again sketch in the details of the ghost village of Coulson, now as dead as any of its citizens resting beneath the boulder monument in Boothill cemetery.

The club reeks with the romance of the old west. Just below it, the Yellowstone highway descends a long hill, through a steep-banked coulee. Here, tradition has it, six or seven of Boothill's occupants departed life when outlaws' guns enforced unwilling obedience upon a stage driver and his passengers.

Atop a huge stone hill, which now has taken unto itself the dignity of a mountain, lies the grave of Captain Luther (Yellowstone) Kelly, alone at last on the one hill which he loved above all others. Here, on lonely nights before even Coulson's rowdy existence was thought of, the famous old scout communed with nature and kept a close watch on his scalp.

On this high hill, says another tradition, the Indians were wont to scan the valley for foemen. When the white men came, their scouts and trappers were not adverse to taking refuge in the holes of the stone cliffs, while on many occasions fugitives from hasty western law, kept watch on pursuers from the lofty perch.

The clubhouse is built of peeled logs. A veranda runs along the north side, while almost the whole of one end is made of a giant fireplace, built of native stone.

The interior is in keeping with the exterior. The barked logs are unadorned, the door is reminiscent of the old latch-string type so well known to our earlier settlers. The fireplace is the only means of heating. But in its yawning mouth a half dozen fair-sized "chunks" crackle merrily on cold days, sending a welcome warmth to all corners of the big room.

Trophies of successful hunts adorn the walls. On a rafter is perched a huge owl, a counsel of wisdom, looking every bit as annoyed with his present company as on the day he was tumbled from his tree.

The coat rack is a deer's skin. The pegs are the hoofs of the animal.

A rack fashioned of logs serves to hold the guns when not in use. Some days there are not enough spaces and the rack is designed to accommodate close to 100.

Even the window shades are in harmony with the general scheme. On each shade is pictured a duck in some familiar pose. The fire screen likewise carries out the thought of the decorator, who was Tom Molesworth of Cody, Wyo.

Mr. Molesworth drew the designs for the blinds and fashioned the screen himself. It is of fine mesh, on which is the scene of a hunter and fisherman asleep in their boat while a duck nestles on the hunter's gun and a fish nibbles at the angler's bait.

The club is the direct descendant of all the sportsmen's organizations that have come and gone since the rails first came to Billings, and not the least important of its purposes is that of preserving the traditions of the earlier days.

The west of ox carts and cattle trails and the west of paved roads and luxurious automobiles seems close when guns are sounding a requiem over the graves of those who died by rifle and pistol.

And if such a thing be possible, the shades of those who "kicked off with



C. H. Smith  
Secretary

### Rawlins Host at Wyoming Shoot

DATES of the Montana and Wyoming State Trapshooting Tournaments have been arranged to permit shooters to attend both. The Montana state shoot will be held at Billings, July 17-18-19. The Wyoming shoot is scheduled for Rawlins, July 10-11-12. Wyoming offers \$300 in trophies and \$700 in cash added prizes. Both shoots will be held under A. T. A. rules. Officers of the Wyoming State Sportsmen's Association are: H. Hansen, president; Bob Ehlers, vice president, and Bob Orr, secretary-treasurer. Officers of the Carbon county (Wyoming) Gun club, under whose auspices the Wyoming shoot will be held, are: R. D. Ehlers, president; Ed Sears and Lloyd Russell, vice presidents; H. Hansen, secretary-treasurer; Ed Higley, field captain, and Joe Wirth, range officer.



their boots on" must smile happily as they watch today's trapshooters perform feats that would arouse the greenest envy of the men whose victims lie under the monument of Boothill.

Not that every shooter approaches the accuracy of Frank Weatherhead, who for five successive years retained the state singles championship for the Billings club; nor "Mendy" Mendenhall, who carried off the title at a championship tournament after breaking 100 straight targets in the regular event and then going out straight in five succeeding shoot-offs before his opponent missed one bird of the final string.

Nor are all as proficient as Rothrock, Campbell, Fultz, McRae, Davies, Selvidge, Coffa, Prater and other ranking shots, but since the first Billings trap club was organized Billings has had its share of marksmen. That it will continue to develop champions is indicated by the average scores of boys who compete in junior events.

Framed by the rugged background of Kelly mountain, and overlooking the winding Yellowstone and the site of Coulson, the ghost town, the club is perhaps one of the most complete and modern of any in the country, and certainly in the west.

Floodlights are to play an important part when the scattergun marksmen of four states gather in July for the annual state shoot. Although the regular events will be shot off during daylight, special night programs are outlined.

Back through the years, almost to the days when Boothill was still the

### Billings Offers \$1000 Added Cash

**B**ILLINGS has extended her hospitable arms to shooters of the state and northwest for the state trapshooting tournament, July 17-18-19. Charles O. Campbell is general chairman in charge under direction of President S. G. Tonkin. The Billings Rod and Gun club has set aside \$1,000 in cash as added money in different events and will also award a number of trophies to become the personal property of the winners. The night of Friday, July 17, will see a special 50-bird race under the flood lights, the first attraction of the sort ever held in Montana. Residents of Billings are preparing to do everything within their power to aid the Billings Rod and Gun club stage the most interesting tournament in the history of Montana clay target sport.

burial ground for Coulson's reckless citizenry, there have been sportsmen's clubs in Billings. With the years and threatened extermination of wild life the purpose of the clubs changed until now fully as much time is devoted by the Billings Rod and Gun club to advancing the ideals of real sportsmanship as to hunting, fishing of "clay target busting."

There was a time, however, when sportsmen had no worries over the diminishing supplies of game and fish. Antelope could be sighted in all parts of the valley, big game abounded in forests which teemed with deer and

elk, while every stream was crowded with trout, the like of which has all but passed from the memory of man.

That was before the influx of settlers, before Billings had swapped its dusty streets for bitulithic paving, and horses for automobiles. Gunmakers, too, still believed that a double-barreled shotgun was sufficient for duck hunting, while big game hunters by the very limits of their weapons stalked their prey instead of shooting it from unheard of distances.

With the coming of automobiles, awkward as they were in a country that had yet to substitute round-up trails for graveled highways, the game began to dwindle and before many seasons sportsmen of Billings, as well as all over the state, were burdened with worries that have increased with the ravages of years.

The first rod and gun club of which there is a record came into existence almost with Billings.

Although known as the Yellowstone Rod and Gun club, few of its members were anglers for the pure sport of the thing—there was then too many fish and far too easily hooked. This club passed out of existence and was followed by the Billings club.

For years, in fact until the Billings Commercial club was created, the Billings club held a commanding place in the community's social affairs, and many of the old-timers' most pleasant

(Continued on Page 7)

## Representative Squad of Billings Rod and Gun Club Leaders



W. K. Moore

S. G. Tonkin

Charles O. Campbell

Ted W. Johnson

Arthur Trenerry

**W**HEN Montana trapshooters gather at Billings July 17-18-19 for the state tournament, they will be greeted by these leaders of the Billings Rod and Gun club and their associates. The club has assets of more than \$10,000, which includes its beauteous grounds, and does not owe a dollar. W. K.

Moore, twice president of the club, is an active member of the Montana State Fish and Game Commission. S. Garfield Tonkin, president of the Billings club, is also president of the state sportsmen's association and of the South-eastern Montana Sportsmen's Association. Charles O. Campbell is vice presi-

dent of the Billings club and life member, as well as general chairman of state shoot arrangements. Ted W. Johnson is the amiable secretary of the Billings club. Arthur Trenerry, treasurer and past president, served two terms as mayor of Billings and is an indefatigable worker.





MONTANA



WILD LIFE

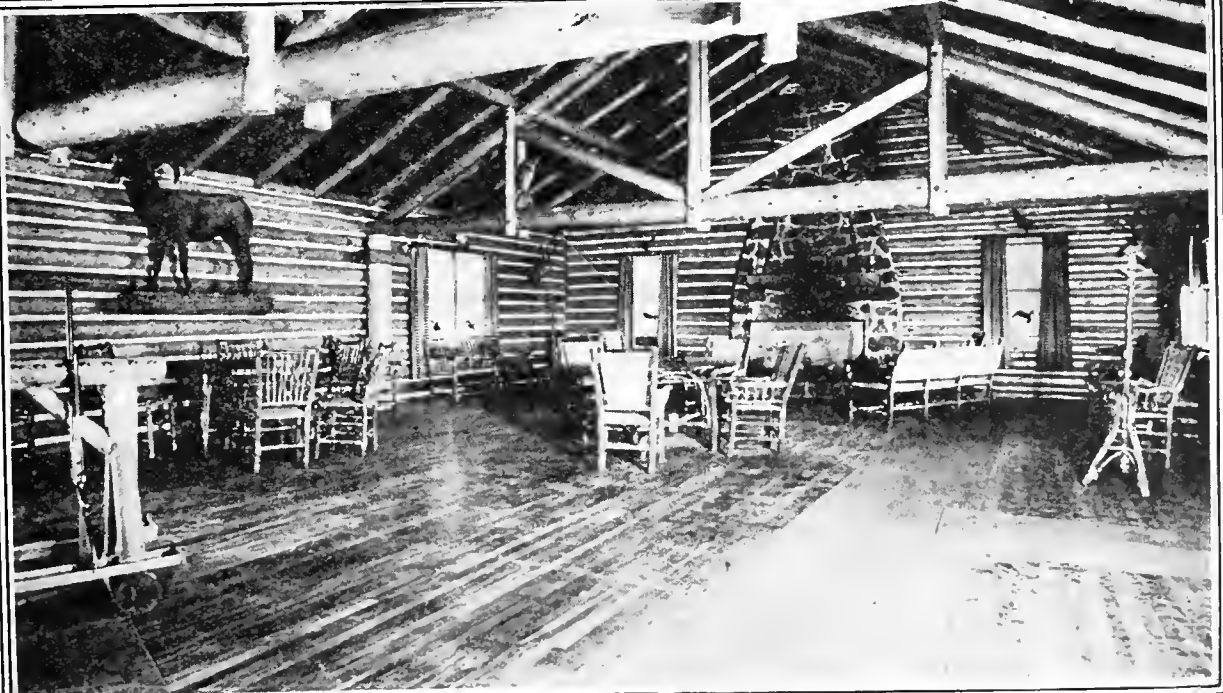


# HOME of the 1931 SHOT

New Club House and Grounds  
of the  
**BILLINGS ROD & GUN CLUB**  
Where the  
Montana Trapshooting Tournament  
will be held  
July 17-18-19th



Grounds Donated by George W Swords



PHOTOS BY FETER BILLINGS



## The Value of Game Birds to Farmers

By Jay G. Diamond, Helena, Federal Crop Statistician



**A**SIDE from the sentimental value of wild life to agriculture there are many ways in which the winged beauties and furry creatures repay agriculture for shelter and food they require. Farmers once regarded wild life about them as something entrusted by nature to their custody and the food that was eaten by this adopted family was given generously without thought of cost. In those days, even though scare-crows were used to frighten hungry birds in newly seeded fields, and other sources of crop damage by birds and rodents were recognized in a general way by farmers, no one had ever cast up a total of the board bill of such visitors and no concerted action was taken by farmers to eliminate any of the less welcome boarders.

However, with the march of events and the development of such campaigns as "swat the fly" there developed similar movements among farmers to "exterminate the gopher and rodent" and make war generally upon insect and bird and animal pests. Like all such movements in early stages, little discrimination was made at first as between the real offenders and all who were suspected of being offenders.

In time a more reasonable attitude developed wherein it was recognized that certain of the wild life on farms not only was causing little actual damage to crops but on the other hand was more than compensating for its keep by destroying bugs and other insects that were a menace to crop yields. With this development there arose a general classification of wild life according to what was detrimental to agriculture and what was either not materially detrimental or actually beneficial to the farmer.

The new class of outlaws included various kinds of rodents, a few birds and some of the larger animals of predatory type. Most of the so-called game types of birds and animals continued to be included in the class of wild life for which extermination is neither desirable or necessary. In other words, despite the fact that ducks will occasionally visit grain fields and that deer will sometimes "bark" trees and elk will occasionally help themselves to hay stacks, farmers on the whole do not begrudge such losses of crops. In fact, it is a rather common thing for farmers and stockmen to come to the aid of game life and provide feed in times when climatic conditions or other emergency may threaten lives.

Farmers and stockmen as a class are brothers "under the skin" with the city sportsman who thrills to the touch of rod or gun; and counts the days when they plan their pilgrimages into the world of wild life. The business

man who, like the truant school boy, ducks out one fine day, despite the pile of work on his desk, finds a counterpart in the farmer who in similar mood sneaks away during the busy growing season to his favorite trout holes.

Farmers and stockmen as a whole would maintain game wild life if there were no other compensation than merely the satisfaction of the old urge to match wits against the instinctive cunning of the game bird or the game animal. In other words the agricultural people, nature loving and living close to the heart of nature, are what nature has intended man to be—true sportsmen. Scarcely a murmur of complaint has come from the farmer who loses grain to the duck flight or valuable hay to the hungry elk.

In his unselfish interest in the game animal the farmer and stockman can expect in return only the reward of a sportsman. But from the game birds as a whole the farmer received a co-operation that makes their presence on his place one of mutual profit.

Farmers Bulletin No. 497, issued in 1924 by the U. S. Department of Agriculture, describes the food habits and relation to man of 19 species of game, aquatic and rapacious birds. Upon findings quoted in this bulletin most of the following comments on food habits of a few of the more common game birds are based. They are designed to show that from a purely practical standpoint birds and especially game birds have an economic value as well as an esthetic value.

### The Prairie Chicken

The prairie chicken is not only a prized game bird by huntsmen but as an efficient destroyer of farm pests any farmer would profit by having these birds reared on his farm. Almost 15 per cent of the bird's food is weed seed including such pestiferous seeds as fox tail, smart weed and rag weed. More than 10 per cent of the diet consists of rose hips. A few of the fruits are eaten but more than a fourth of the feed is browse. The prairie chicken is fond of grain but takes it from stubble. The bird is also fond of insects, eating almost any kind of grasshopper, also locusts and crickets. The menu includes especially some insect pests well known in Montana, such as potato bugs (Colorado beetle) army worms and cut worms.

### The California Quail

In the fruit growing regions of the west coast states, the California quail is abundant. Although this game bird is fond of grapes, little complaint has been made by fruit growers, for the reason that it also eats large quantities of seeds of noxious weeds and a large number of pests such as ants, caterpillars, flies, spiders, and counting minute insects, the total list is something over 280 varieties. The fruit diet

of the bird on a yearly basis made up but 2.3 per cent of the total, according to analysis of stomach contents.

### The Grouse

The grouse, a wild and wary bird, eats a diet in agricultural sections quite similar to the prairie chicken, together with considerable wild fruit and browse.

### Introduced Pheasants

Mixed praise and criticism has been directed at the introduced pheasants that are accused of digging sprouting corn, oats, barley, beans and other crops. They are said to drive chickens away from feed and to even kill young poultry. Most of such complaint, however, has come from eastern states where agricultural crop land is a larger portion of the total land than in the west. While it is true that these pheasants will eat crops, much depends upon the proportion of land under cultivation and the quantity of wild food available, since the birds' diet also includes considerable of weed seeds and insects. In Montana their crop depredations are not considered serious.

### Gulls

Early Mormon history recites a story of how the gulls devoured the crickets that threatened to eat up the first grain crop, seeded by the Mormon settlers. Gulls, while not game birds, are farm assets enough to deserve mention. Their food habits, so far as known, are all beneficial to the farmer. They are great grasshopper eaters and can catch them on the wing and will even follow the plow to pick up grubs and beetles turned up.

### Wild Geese

Wild geese subsist almost entirely on green forage such as that eaten by cattle. The summer pasturage and winter feeding grounds of these birds are well beyond the boundaries of Montana so that our concern is chiefly the diet when in flight. Geese in flight like grain fields but are seen mostly in the stubble picking up waste grain.

### Mallard Ducks

Like wild geese the diet of mallard ducks in summer and winter feeding grounds is of little interest to Montana farmers. In flight ducks, like geese, eat at the most convenient lunch counters, but prefer to stay on water, provided natural feed is sufficient. Their actual damage to grain fields is probably not large in the aggregate. Several years ago a Montana farmer with a government seed loan wrote the seed loan office that a flock of mallards had eaten most of his grain crop and since the ducks were the "floating property of Uncle Sam" he thought he should be reimbursed. The seed loan official replied that since the origin of these ducks was Canada, he could not grant the claim that they were the floating property of Uncle Sam, and that they might as justly be considered the floating property of the Canadian government.



## Trapshooters Gather at Billings In July

(Continued from Page 4)

memories concern the club and its jovial membership.

But hunters and fishers are a hardy breed. The true disciples, those who were willing to get up long before dawn and drive a buckboard miles to fishing or hunting grounds, found the polite gestures boring, lacking in the sense of competition that is the salt of life to wielders of the rod and gun in all ages.

One by one these kindred souls gathered together. Trap shooting was just coming into prominence, back in the nineties, the "Gay Nineties" of the Gibson girl and high-wheeled bicycles.

Dr. W. A. Allen was one of the leaders in the founding of this gun club. Among those who flocked to the doctor's standard were George Soule, H. F. (Doc) McFarlin, his brother, C. S., J. D. Whelpley, M. G. Mains and J. W. Vaughan. Of this nucleus at least two remain devoted to field and stream. They are Dr. Allen and "Doc" McFarlin.

The accepted target in those days was the glass ball. Not unlike the type made famous by the deadly shooting of Col. William F. Cody in his "Buffalo Bill" circus, the balls were shot from traps at terrific speeds and a man who could "go straight" could almost close his eyes and bring down a flying quail.

Evenings the "gang" would congregate on the vacant ground to the east of the Joe Zimmerman home and break glass balls.

With the encroachment of buildings, the shooting grounds was moved further east and it was then the gunners were introduced to clay targets, today the standard clay pigeon.

The club was loosely organized. It never was christened and with the advent of the flat clay pigeon, it nearly ceased to function.

Conductor A. E. Anderson and Jim Juhl of Billings later organized a trap shooting club for railroad men. It prospered for a time but with the shifting of employes came the desertion of the club.

About 1897 and 1898 another club functioned, using the grounds at South park.

The next club to flourish was formed by W. A. Selvidge. He served as its first president and the organization was more or less formally known as the Selvidge club. L. C. Babcock, also a prominent business man, served as secretary.

This was the only sportsman's organization in the city as the new century dawned. Trap shooting became increasingly popular, although as yet the sportsmen had done little more than talk about game conservation. There was still tremendous resources of wild life and although everyone agreed that something should be done

to protect it, little in the way of practical conservation was initiated.

During the first decade of the new century the Selvidge club continued alone in its field. Then, so gradually

## Wily Hun Plays Trick on Chink



SOME fellers are so confounded lazy that they shudder at work and deliberately pass the chores by slipping their jobs to some more courageous associate. Here's a picture taken by Kenneth R. Roehen near Moiese, Mont., showing how Mrs. Hungarian partridge laid 5 eggs in the ground floor apartment occupied by Mrs. Chinese Pheasant, who was mothering five eggs—and now the Oriental lady is clucking over the variegated assortment. When she finds that some of her offspring originated in Czechoslovakia and some near Hong Kong, the result will be pitiful. Mr. Roehen, who is United States game protector in Montana, has visited the nest several times and writes that the female Chinese pheasant is always doing the work while Mother Hungarian is nowhere in sight.

that none was at first aware of it, the structure began to crumble and by 1912 the club was practically disbanded.

Aroused by the threatened extinction of wild life, sportsmen in all parts of the country were banding themselves into clubs formed for the redemption of wild life and its propagation in forest and field and stream.

Billings fell in with the movement early in 1913. Trap shooting was regarded as an excellent outlet for the natural desires of hunters who otherwise would be afield, and almost from the date of its formation the club had its private traps.

At the first election after incorporation W. K. Moore, for many years a leader in the game conservation movement, was elected president. He served for several years and during his time the club became known as one of the strongest supporters of legislation tending to curb the relentless taking of fish and game.

Mr. Moore now serves as a member of the state fish and game commission and is particularly interested in developing wild life resources of the state as a whole. Of recent years he has devoted much of his time to studies of migratory fowl.

There are probably 100 regular Billings shooters and at least five times that number of occasional shooters. The diminishing number of wild birds is a big factor in the conversion of many a hunter into a trap shooter, and it is likely that the clay gunners will gain a constantly growing number of recruits.

The modern history of the club dates back to 1921, when Mayor Arthur Trenerry was elected president. Club members avow that the figure of Mr. Trenerry is perhaps the most outstanding of all those who have contributed to the organization.

Mr. Trenerry served until 1927, when George Longanecker took over the reins for a one-year term.

S. Garfield Tonkin became president in 1928, and is serving his third term. He is also president of the state association with C. H. Smith of Butte as secretary. Mr. Smith has held this position for more than 40 years.

### A GOOD EXAMPLE

The newly crowned Emperor of Abyssinia reveals himself as an enlightened ruler. He has suspended permits to kill game in much of his realm. This has in recent years become one of the world's most famous big game hunting sections. Foreign hunters have brought money into the country, but the Emperor realizes that money cannot bring back native wild life, once it is destroyed. It's a lesson which more "civilized" countries took a long time to learn and haven't yet mastered.

"Now," said the college boy to his dad at the football game, "you'll see more excitement for \$2 than you ever saw in your life."

"I doubt it," replied the old gent, "that is exactly what my marriage license cost me."

# Montana Fish and



# Game Commission

W. A. BROWN, Great Falls...*Commissioner*

JOS. L. KELLY, Anaconda...*Commissioner*

W. K. MOORE, Billings...*Commissioner*

E.A. WILSON, Livingston...*Commissioner*

T. N. MARLOWE, Missoula, *Chairman*

R. H. HILL, Helena, *State Fish and Game Warden, Secretary*

## MONTANA WILD LIFE

Official Publication of the State Fish and Game Department.  
Published Monthly at Helena, Montana

FLOYD L. SMITH, *Editor*

Subscription Rate \$1 per Year—15 cents per Copy  
Advertising Rates on Application



Copy for advertisements subject to approval of State Commission and must be in the hands of the editor at the State Capitol building, Helena, on the 15th day of the month preceding publication date.

VOL. IV

JULY, 1931

NO. 2

### LACK OF OXYGEN KILLS FISH.

**W**HILE fish culturists of the Montana State Fish and Game Department are constantly engaged in studying piscatorial problems of spawn-taking, eyeing, hatching, distribution and water content, other problems continue to arise that require solution. An outstanding example is that of the lack of oxygen content in many Montana lakes, most notable being conditions at Gravelly Range lake in Lewis and Clark county. In many land-locked lakes where there is little disturbance of the water, where the depth is great and the contour of the bottom strangely formed, the oxygen shortage becomes apparent. Suffocation of fish is the result. Many salmon and trout have been planted in this little mountain lake, yet only at certain times of the year do they rise to the surface. Some dead fish have been found. Bass and perch have recently been planted there for experimental purposes and the lake closed to fishing until further order of the commission.

Decomposition of vegetation absorbs a great amount of oxygen at times when the oxygen content of lakes is at low ebb, it is stated.

Similar problems confront the fish culturists of Michigan. Driven up by lack of air, thousands of choice game fish, bass, blue gills, pike and perch, suffocated when Jones lake, a 25-acre lake almost within the Lansing City limits, lost its oxygen.

Indications of fish suffering were noticed first when a number of adult fish were found dead and thousands of last year's hatch, principally speckled bass, warmouth bass, and golden shiners on the surface of the water were gasping for air.

Although of the opinion that the condition was due to lack of oxygen, the Department of Conservation made a thorough examination of the lake, taking samples of water at several points in various depths. It was found that the lake contained no oxygen except a slight trace at the surface. The temperature ranged from 85 degrees at the surface to 58 degrees in 20 feet at one point. An outboard motor boat was placed in the lake to disturb the water and alleviate the condition until atmospheric conditions changed.

Reports of this nature reach the department every season. These reports are received generally following the spring break-up when the ice leaves the lakes, and later following the spawning season when water temperatures are high. This is generally found in the smaller lakes which have no surface inlet or outlet. High winds and rain usually relieve such conditions immediately.

The man who does his level best today always does better tomorrow. The cumulative effect of steady work and constant saving is a tremendous power in a man's life.

### HUNGARIAN WOULD BE NURSE MAID

**S**UPERINTENDENT J. F. HENDRICKS of the state game farm at Warm Springs is conducting a series of interesting experiments. He is meeting with unusual success in rearing the top-knotted California quail. Like success is promised in rearing Hungarian partridges in captivity. Then he has successfully crossed the Lady Amherst and Melanistic Mutants, two hardy long-tailed game birds of Asiatic origin. His principle troubles have been with Hungarians.

The cock Hungarian partridge is one hubby who will fight his wife for the honor of being nurse-maid to his children. The mothering instinct is so highly developed in the male of this game bird that mating "Huns" often have hectic connubial days ending in tragedy or divorce, with the cock strutting proudly away with the offspring.

This martial secret of the partridge family is a big reason the bird is increasing in America. It enables the young birds to survive even if the mother meets with some accident, and also causes the female to bring forth two broods in a season, in a vain attempt to rear more loyal youngsters.

But the lady has her day prior to matrimonial disillusionment. Unlike the female of some species, she makes no coy effort to conceal the fact that she is the chooser, but selects the lover she prefers whether he likes it or not. And game farm keepers have found that if they try to sell her on the idea of a mate not to her liking, that unlucky swain is fortunate to escape with his neck.

After the birds have mated in the spring, however, and the female has laid her nest of approximately 23 eggs—an accomplishment at which even this motherly mate can boast no special ability, the cock insists on incubating the eggs. Should the mother bird leave her nest, he takes possession, and it is often quite a task for the female to drive him off again.

As soon as the young hatch, the cock commences calling in his most coaxing manner, and soon all the chicks have deserted their mother to nestle under his wing.

This often brings warm family dissension, but usually ends with the mother contenting herself with a second brood.

"Now, I love fishing dearly. There is no sport like it for me, but there is a vast deal in fishing besides catching fish."—H. H. Thompson.

### PHEASANTS DO NOT KILL BABY RABBITS

**T**HE cocky ringneck pheasant, blamed for many depredations, is absolved from the belief that he and she kill young rabbits, according to findings of officials of the Pennsylvania Board of Game Commissioners. These officials observed hundreds of rabbits, varying in size from six inches to adult, in all the fields of the state game farms. On no occasion have the officials or any of the helpers seen pheasants molesting the young rabbits, some of which entered the pheasant coops.

Oil of penny royal with water and applied to face and arms is mosquito bite preventative.

### WET HANDS SAVE MANY SMALL FISH

**M**ILLIONS of small fish can be saved this summer by wetting the hands before taking them off the hook and putting them gently back into the water. Dry hands disturb the protective film of the fish, causing fungi to attach to the injured places. This fungi eventually kills the fish, experts declare. Whereas if the hands are wet the film is not disturbed and the little fish are not permanently injured if gently handled. These grow up and afford the angler future pleasure and food that otherwise would be lost.





## FISHING AS AN ESCAPE

MARY ROBERT RINEHART writes: Fishing offers rather the same escape from the troubles that infest the day as does the reading of a detective story. In both cases the occupation is a focusing of the attention on something quite apart from the self. The angler is intent on his line, the reader is intent on his crime.

Probably the brain worker turns to fishing for several reasons. He may simply like to fish; or he may need air and sun without too much exertion, since brain workers are proverbially underexercised; or he may find in it distraction from thinking.

Personally, the thinking I do while fishing is purely and solely about fishing. Are they here? Shall I move there? To me fishing is a philosophy rather than a sport. I hold no brief for competitive fishing; the biggest fish, the most fish, mean nothing to me. I know no envy, and I know only one resentment—the useless killing of brave fish which are merely trophies.

In pursuance of my philosophy, it is almost enough simply to be fishing. Almost, not quite. I want a fish now and then. But any furious desire for fish defeats my purpose, which is primarily a sense of peace. I do not think about peace, I merely feel it. I think about my line, deep in the sea, or the fly, badly cast into a pool in some mountain brook.

And the surface of the water becomes mysterious to me, covering the things I cannot see. If I think at all, it is about those things I cannot see.

One day at the ranch I went fishing up the canyon. I sat all afternoon and I caught no fish. When twilight fell I was still there, out on a rock in the roaring stream; and a cowboy on horseback on the trail above, unable to make me hear, had to shy a stone into the water to attract my attention.

"Hey!" he shouted. "Don't you want any supper?"

Simplicity should be paramount in camping.

## READ THE FEDERAL BASS LAW

MONTANA sportsmen interested in the protection of black bass should familiarize themselves with the provisions of the recently enacted federal black bass law. Briefly the law prohibits transportation of large mouth and small mouth black bass from one state to another that have been caught, sold or transported contrary to existing state law; in other words, a violation of the federal law is predicated on a violation of state law; then the fish must be taken out of the state where the state violation occurred.

One of the important features of the law is that section which requires any package or container containing such black bass transported interstate shall be clearly and conspicuously marked on the outside with the name "Black Bass," and accurate statement of the number of bass contained, and the names and addresses of the shipper and consignee. An important section is that relating to the seizure of black bass transported in violation of the law; fish illegally transported interstate may be seized by any authorized employee of the Department of Commerce, or U. S. marshal.

Hope and a red rag are baits for both men and mackerel.

## GET OUT AND WET A FLY

PRESIDENT HOOVER has ordered out his fishing equipment. Fishing is the one sport where a man completely forgets all else. Up to his hips in the center of a stream, or out on a lake with just enough breeze to ruffle its bosom. The fish biting—not too good—just good enough to make the sport real interesting. It is really mental house-cleaning time. Evil thoughts are thrown to the four winds. Clean, fresh air is inhaled. Plenty of exercise. Beautiful scenery. The appetite goes into high gear. President Hoover compares fishing to prayer, he says: "Next to prayer, fishing is the most personal relationship and of more importance than the fact itself." Montana anglers should take advantage of opportunities. It isn't the number of fish you catch which governs the success of the trip—it is the renewed energy gained. We shouldn't take life too seriously because we will never get out of it alive anyway. Get outside in the open and spend some of the time fishin'.

## PUBLIC OWNS WILD GAME, SAYS COURT

AugMENTING the American Game Policy, in an effort to help solve the farmer-sportsman hunting problem, the conservation department of E. I. duPont de Nemours & Co., Inc., of Wilmington, Del., has just published a book, "Wild Game—Its Legal Status," in which many points regarding the ownership of game are clarified. The volume has been received by the Montana Fish and Game Department. It is a compilation of decisions on ownership of game, from the United States Supreme Court, federal courts, and state courts, representing nearly every state.

"This book is another valuable contribution to conservation, made by the duPont company," according to Seth Gordon, president of the American Game Association, "and the duPont company authorizes me to announce that it will distribute this book free of charge, as long as the supply lasts, to those requesting it. This book should be in the hands of every legal department of every state and of every rod and gun club library. Sportsmen, farmers, landowners and others interested in conserving and restoring the great outdoors for the benefit of all should also be interested."

Decisions of all courts are unanimous in declaring that the public owns the wild game, with title vested in the state to protect and preserve it.

A general misunderstanding of the legal status of game obtains in many states. Many landowners think they own the game on their land; farmers and renters think they do. Often the sportsmen claim sole ownership of game because they pay license to hunt it, according to expressions throughout the country.

A little fire will cook your meals; a big one will cook your skin if a forest fire results.

## DOGS TURN WILD AND ELUDE OFFICERS

WILD dogs and wild house cats are presenting a problem to game officials of the country. Dogs and cats, reverting to wildness in the woods and fields of settled sections, are a growing menace to beneficial bird and animal life.

Numerous complaints from conservation field men in Pennsylvania that families of wild dogs are hunting in packs in their districts have caused the game commission of that state to order stricter control of roaming dogs and house cats during the nesting and breeding season.

Several dens have been discovered where dogs supposedly gone wild after being abandoned by their owners, have raised wild families. The animals are said to be so elusive and trap-wise that dozens of traps have been set for them without success, although a number of allegedly wild dogs have been shot while pursuing game.

To simplify the control of wild and half-wild house cats in woods and fields a bill now before the Pennsylvania legislature would compel cat owners to license and tag their pets. It would also provide that even licensed cats may be killed when seen pursuing birds. In practically every state it is illegal to let dogs run at large during the spring and summer months when game birds are nesting, but the proposed act is believed to be the first attempt to curb the destructiveness of house cats by outlawing ownerless felines. Officials now hold that stray cats are the worst enemies of bird life in cities as well as rural areas.

"Who can help wishing to go afishing in days as full of joys as these."—Henry Van Dyke.

## DEER IS LIKE OSTRICH

THE recent discovery that deer have a mental twist like that of the fabled ostrich which stuck its head in the sand to hide from its enemies has resulted in the first successful deer trap. Wild life experts have tried for years to design a deer trap in which a large percentage of the captured animals did not kill or injure themselves.

The new trap, built by the Pennsylvania game commission, is much like the old type except that it is equipped with rolled curtains. When the deer enters the large poultry-wire box and touches the trigger, the curtains fall and shut out all view. Instead of leaping wildly against the walls as formerly, all captives so far have remained perfectly quiet. The deer are trapped in sections where they are numerous for shipment to other areas.



## More State Bird Preserves Are Created

**T**WO additional bird preserves, both within a short distance of two of Montana's leading cities, Great Falls and Missoula, have been created by the State Fish and Game Department, following petitions filed by sportsmen, and the holding of hearings in both cities. Action was taken at the last meeting of the commission which was held at Anaconda.

The area in Cascade county, to be known as the Great Falls Game Preserve, extends from the Rainbow dam in the Missouri river, 100 yards on each side of the bank of the river, to the south line of the north half of the north half of Section 23, Township 20 North, Range 3 East. The grounds of the Great Falls Gun Club are excluded. The preserve also includes the Sun river from its mouth to the west boundary lines of the city limits of Great Falls.

The game bird refuge near Missoula is at Milltown, in that portion of the waters formed by the Montana Power dam, from the dam to the Milwaukee bridge above the dam. It is to be known as the Milltown Bird Preserve, and it is expected to be a haven for migratory waterfowl. The waters are all in Missoula county. It is unlawful to carry or discharge firearms in the preserve except by permit issued by the State Game Warden for the purpose of destroying predatory animals and birds.

Those present were Thomas N. Marlowe, chairman; E. A. Wilson, W. K. Moore, J. L. Kelly and W. A. Brown, commissioners; Robert H. Hill, secretary; Kenneth F. MacDonald, superintendent of fisheries; Paul J. Fair, photographer; J. F. Hendricks, superintendent of the State Game Farm, and William Carpenter, president of the Butte Anglers' Club.

State Game Warden Hill advised that the engineer for the Montana Power company had told the state engineer that if the commission desires to keep the water in Red Rock lake at the proper level, the water in the lake should be increased a foot this spring, to cope with the evaporation this summer. The state engineer will make a trip to that district and investigate whether raising the water a foot will damage any property. It was agreed that if Mr. James, state engineer, deems it advisable to raise the Red Rock dam an additional foot, that this work be authorized, at an expense not to exceed \$300.

Mr. Hill reported that he had advertised and held a public hearing on May 21, in Great Falls, in regard to the petition the commission had received from the Great Falls City Park commissioners for a game refuge on the Missouri river. There were several present at the hearing, and no one appeared to protest the creation of the preserve.

### Fish Eggs for 1931 Total 35,398,479

**M**ONTANA'S great spawn-taking stations have completed their work for the season. Sufficient game fish eggs have been taken to fill the 14 fish hatcheries, and leave a surplus for exchange. In every case dry weather has halted the work before the cleanup.

Figures compiled by the State Fish and Game Department show that the total number of eggs artificially taken from native trout, rainbow trout, and grayling, during the few weeks of the season has reached 35,398,479. Of these game fish eggs 30,096,490 are native trout taken at Flint creek at Georgetown lake; 3,725,050 rainbow taken at Flint creek, Lake Ronan and Lake Francis, with only 1,576,939 grayling as the take from Flint creek.

The Flint creek station reports 30,096,490 natives, 218,430 rainbow, and 1,576,939 grayling. The Lake Francis station, 226,400 rainbow eggs, the Lake Ronan station, 3,280,220 rainbow.

In 1929, the total native trout eggs taken at Flint creek reached 24,119,200, and in 1930 the mark was 38,849,700. Last year the fish culturists at the Flint creek station devoted 32 days to the work. This year, because of constantly receding waters, there were but 17 days allotted to the task. During the final day at Flint creek 1,083 trout were artificially stripped.

These eggs have an approximate commercial value of \$2 per thousand. The native trout eggs average 294 to the fluid ounce and the grayling 12,000 to the fluid ounce. The eggs are now distributed in state hatcheries being hatched for distribution among rearing ponds where the fish will be fed and retained until of goodly size and then released to provide joy to Montana sportsmen and their guests.

Mr. Kelly's motion carried as follows: "It appearing to the commission that a proper petition has heretofore been received by the Fish and Game Commission, asking for the creation of a game preserve in Cascade county, and that a proper public hearing, as required by law, has heretofore been held in this matter, and that there has been no protest to the same, I move that we, the State Fish and Game commission of the State of Montana, do hereby proclaim and create this preserve as a game preserve of the State of Montana, to be known as the 'Great Falls Game Preserve,' in the following described territory, to-wit:

"From the Rainbow dam of the Missouri river to the south line of the north half of the north half of Section 23, Township 20 North, Range 3 East, and extending inland one hundred (100) yards from the bank of said Missouri river on each side, exclusive of the plot of ground used by the Great Falls Gun Club; and also that portion of Sun River, from its mouth to the west boundary lines of the city limits of Great Falls, Montana, and extending

inland one hundred (100) yards on each side of the said Sun river, all of which is in Cascade county, Montana; and the above-described territory, known as the Great Falls Game Preserve, shall be governed as a bird and game preserve of the State of Montana, wherein it shall be unlawful to carry or discharge firearms, except when permit has been granted by the state game warden to carry and discharge firearms thereon for the purpose of destroying predatory birds and animals. The secretary shall be instructed to immediately post and publish the proper notices of this order."

A petition was read from the residents of Milltown, asking the commission to create a game bird refuge in Missoula county, of that portion of the waters formed by the dam belonging to the Montana Power company, located near Milltown, from the dam to the Milwaukee bridge above the dam. Mr. Marlowe advised that he had advertised and held a public hearing May 19, in Missoula, and that there had been no protest. Mr. Marlowe's motion, as follows, prevailed: "It appearing to the commission that a proper petition has been received by the commission, asking for the creation of a game bird refuge in Missoula county, and that a proper public hearing, as required by law, has heretofore been held in this matter and that there has been no protest to the creation of the same, I move that we, the State Fish and Game Commission of the State of Montana, do hereby proclaim and create this refuge as a game bird refuge of the State of Montana, to be known as the 'Milltown Bird Preserve,' in the following described territory, to-wit:

"A portion of the waters formed by the dam belonging to the Montana Power company, located near Milltown, Missoula county, Montana, which said portion of said water will begin at the dam and extend to the Milwaukee bridge above said dam, all of which is in Missoula county, Montana; and the above described property shall be governed as a game bird preserve or refuge of the State of Montana, wherein it shall be unlawful to carry or discharge firearms except where permit has been granted by the state game warden to carry and discharge firearms thereon for the purpose of destroying predatory animals and birds. The secretary shall be instructed to immediately publish and post the proper notices of this order." Seconded by Mr. Wilson. Carried.

The Plains Rod and Gun Club asked that the closed season be changed on Rainbow (or Dog) lake, in Sanders county, to protect rainbow trout while spawning. No action was taken and the secretary was advised to secure information as to exact dates desired for a closed season.

The Broadwater County Rod and Gun Club asked the commission to close to



fishing a portion of Deep creek, and its tributaries, in Broadwater county, to fishing for one year. With the water very low, the creek and tributaries were closed to all fishing from the bridge at the West Pavilion to its source, until further order of the commission."

The Musselshell Valley Sportsmen's Association reported planting loch leven trout in the streams on the Baxter ranch, and asked that American Fork and its tributaries, on the Baxter ranch, be closed to fishing to protect the small fish therein. By order of the commission, American Fork and all its tributaries, on the Baxter ranch, in Wheatland county, between the bridge on the Harlowton-Big Timber road and the bridge on the Harlowton-Lunney road, was closed to fishing until further order of the commission.

Mr. Hill explained that, in accordance with the orders of the commission now in effect, Dog and Hope creeks, in Lewis and Clark county, are closed to fishing from their sources to where they fork, the stream then becoming Dog creek. This creek is a tributary to the Little Blackfoot, and as such, is closed to fishing in Powell county. There is therefore a small portion of Dog creek, in Lewis and Clark county, which is open to fishing, and should be closed. The commission directed that these streams be closed to all fishing in their entirety, until further orders.

The Lewis and Clark County Rod and Gun Club asked for the opening of Krohn, Two Point and Twin lakes, on the upper waters of the Big Blackfoot river, in Lewis and Clark county, during the regular open season. These lakes have been closed to fishing the last few years, and are now re-stocked. The commission approved.

Frank Woody, of Helena, protested against the closing of Grayling and Teepee creeks, in the Yellowstone Park district. Mr. Hill advised that the petitions for the closing of these streams had been signed by all residents of that vicinity, and that the park officials have co-operated by having Grayling creek, within the park boundaries, closed to fishing. The request of Mr. Woody was denied.

Mr. Hill advised that there are several feeder streams entering Cliff lake, in Madison county, which are full of small fish. He read a letter in this connection from Mrs. Vern Neely of Cliff lake, asking that these streams be closed to fishing. The lake is filled with large fish, and Mr. MacDonald recommended that the feeder streams be closed to fishing. All streams entering into and running from Cliff lake, in Madison county, were closed to fishing until further order of the commission.

Mr. Hill advised that under the laws governing fur farming in this state, the commission is given the power to make certain corrective rules and regulations, if deemed necessary. At the present time, after a fur farm license is granted, the licensee is permitted to take a limited amount of foundation stock, either during the closed or open season, and in many cases trap-

## Just Before the Battle



These buffalo bulls, pawing the snow in Yellowstone park, are preparing for the battle of the fall timbers. The winter scene is provided through the courtesy of Joseph Joffre of the National Park service.

pers are hired by the licensee to take this stock. This privilege is being abused, and many are trapping illegally under the law. Hence, the commission ordered that in the future, any person engaging in the breeding of game animals or birds, and fur-bearing animals, in Montana, be compelled, on securing a permit for a fur or game farm, and receiving permission to take certain foundation stock, to trap his own foundation stock, under the rules and regulations promulgated by the State Fish and Game Commission; or if license or permit is obtained by a company, association or corporation, that some one individual member belonging to the company or association be designated as the party to capture the animals or birds for foundation stock.

The secretary read a letter from the Anaconda Anglers' Club, requesting that certain waters in the Big Hole basin, Beaverhead county, be closed to fishing from late fall until July 1, to protect the spawning fish therein. The Wisdom sportsmen and the forest supervisor in that district concur with the Anaconda club. The commission ordered the request of the Anaconda Anglers' Club granted, and that the closed season on the following described waters be extended to June 30, inclusive, of each year, until further order of the commission: Pintlar lake, Mystic lake, Mussigbrod lake, Twin lakes, Minor lake, Deerhead lake, Sand lake and O'Dell lake; also all creeks and streams running into these

lakes, in their entirety; and all creeks and streams running from these lakes, for a distance of two (2) miles, or to a point where they leave the National Forest boundary, all of which are in the Big Hole basin, in Beaverhead county, the closed season therefore to be from March 15 to June 30, both dates inclusive, of each year.

J. M. Bresnahan, manager of the Midland Empire Fair, asked whether the commission will have a fish and game exhibit for the fairs throughout the state this year, and whether the Billings fair could display the exhibit. Mr. MacDonald was authorized to investigate water conditions at Billings, to see whether fish could be displayed there this fall safely. The value of the exhibit, as an advertising and educational medium, was stressed. Mr. Marlowe also presented a request from the All-Flathead County Fair, at Kalispell, for the exhibit. It was ordered that the Fish and Game Department continue its policy of placing exhibits of game and fish at the State Fair and other fairs throughout the state, so far as possible.

G. T. Boyd, former commissioner, protested the expenditure of \$1500 for an aquarium at the Great Falls hatchery, as authorized at the previous meeting. He suggested that rearing ponds be built with this money instead. Mr. MacDonald and Commissioner W. A. Brown advised, that after making a study of conditions at the Great Falls hatchery, it was decided to build a pool in the hatchery yard for a display of fishes, instead of an aquarium, which would add to the appearance of the hatchery, and would be cheaper. Mr. Brown advised that this pool could be built and necessary repairs made on the interior of the Great Falls hatchery for not to exceed \$500. In connection with Mr. Boyd's request that rearing ponds be built, Mr. MacDonald reported that the pond on the Dearborn has been completed satisfactorily, and another is being repaired. The commission directed that in lieu of the aquarium authorized for the Great Falls hatchery, Mr. MacDonald be authorized to revise his plans and build a display pool for fishes, and make interior repairs as outlined.

Chairman Marlowe read a letter which he had written to the Bureau of Biological Survey, by order of the commission, protesting their action in shortening the duck season in Montana, and considering taking over Red Rock lake for a federal refuge. The commission went on record as being unalterably opposed to the Bureau of Biological Survey taking over Red Rock lake as a federal migratory bird refuge; ordered that the bureau be so advised; and that the secretary be instructed to write to the Montana congressmen, enlisting their assistance in preventing such action.

The commission ordered that payment on all bills presented to the Fish and Game Department for court costs incurred in trying game law violations, or for board of prisoners convicted of game law violations, be refused. Ed Boyes, of Libby, advised that he had interviewed the Lincoln county com-



missioners, asking them to withdraw for board of prisoners and court costs their claims against the department in game law cases in Lincoln county, and they had suggested that the commission table the Lincoln county claim. The commission expressed appreciation for Mr. Boyes' co-operation.

The request from Leon C. Lake, district ranger at Philipsburg, endorsed by the Philipsburg Anglers' Club, asking the closing of a portion of East Fork of Rock creek, in Granite county, was approved inasmuch as there are beaver dams in the creek which make ideal rearing ponds. Deputy McCaffery recommended the closing of this portion of the stream. The closed waters include that portion of the East Fork of Rock creek, and all its tributaries, in Granite county, beginning at the intake of the Mungas Irrigation ditch, in the E½ of Section 31, Twp. 5 N., R. 14 W., thence to the headwaters of the East Fork of Rock creek, in Twp. 3 N., R. 14 W. (unsurveyed).

The Hamilton Sportsmen's Club telegraphed the commission to close Lake Como, in the Bitter Root valley, to fishing to protect the bass planted therein. They also requested an open season on mountain goats in Ravalli county. It was directed that Lake Como in the Bitter Root valley in Ravalli county be closed to fishing until further order of the commission.

An open season was declared on Rocky Mountain goats on the west side of the Bitter Root river, in Ravalli county, from October 15 to Nov. 15, both dates inclusive, 1931, the limit to be one goat of either sex for each person.

Commissioner Brown advised that the closed season should be extended on the Tintinger sloughs, running out of the Missouri river, in Cascade county, to protect the bass therein, during their spawning season, and by direction of the commission the closed season for bass fishing in the Tintinger sloughs, in Cascade county, was set from March 15 to June 30, both dates inclusive of each year, beginning with March 15, 1932, until further order of the commission.

It was reported that the sapphire mining operations are polluting the water in the West Fork of Rock creek, and the company operating these mines should be asked to put in settling ponds. The secretary was instructed to advise the owners of the sapphire mine that their operations are polluting the waters of the West Fork of Rock creek, and ask them to co-operate with the Fish and Game Department and the sportsmen of the state by installing a settling pond.

Mr. Brown reported a letter received from A. J. Koles, honorary deputy warden, of Great Falls, suggesting the Dueringer ranch, on the Middle Fork of the Dearborn as an excellent site for rearing ponds, and it was directed that as soon as Mr. MacDonald can find time, he and Mr. Brown investigate this matter and report to the commission.

Mr. Wilson reported that he has been investigating the possibility of securing a lease on three lots on the shore

line of Dailey's lake, at a rental not to exceed \$15 per year, which would give the department certain jurisdiction over this lake, were it ever considered for a private refuge or hunting grounds. The present lease on these lots will expire in 1932, and they are state property. The secretary was instructed to take up this matter with the State Land Board, securing the legal description from Mr. Wilson, to ascertain if a lease can be secured on these lots without a rental charge.

Mr. MacDonald advised that the Giant Springs in the Missouri river have been closed to fishing for some time. He said there are many diseased fish in these springs, and as the water used by the Great Falls hatchery is taken from these springs, the disease is often transmitted to the fish in the hatchery, and many loch leven have been lost as a result. He suggested that the commission open these springs to fishing, so that they will be cleaned out, and suggested that the pond which is to be built in the yard of the hatchery will serve as a display for fish, for which the Giant Springs have formerly been used. The commission directed that all orders pertaining to the Giant Springs in the Missouri river, Cascade county, be rescinded; and that these springs be open to fishing during the entire year.

Mr. MacDonald advised that there have been some bass and perch planted in Gravelly Range lake, in Lewis and Clark county, and suggested that it be closed to fishing to protect these fish. Cecil V. Wilson, president of the Lewis and Clark County Rod and Gun Club, concurred with Mr. MacDonald in this

matter. Trout and salmon do not seem to do well in this lake. Gravelly Range lake was ordered closed to all fishing until further order.

Mr. MacDonald reported that he and W. A. Brown had made an investigation of the Milne pond, at Milligan, as requested by the commission, and although they did not approve the agreement suggested by Mr. Milne, Mr. MacDonald had made him the following proposition: That he could build five more dams on his property, thereby making six ponds fed by springs; that the department have the three lower ponds and Mr. Milne have the other three; that the commission give Mr. Milne 25,000 fry for the first year for the use of these ponds, and 25,000 each year, in payment for the use of the ponds and his services in looking after them. Mr. MacDonald explained that this would give the department three excellent perpetual rearing ponds, that he did not believe much feeding would be necessary, and that the lease could be arranged as the commission saw fit. The department would feed their own fish, and Mr. Milne his. Mr. Milne is agreeable to such an arrangement. The commission ordered that the department enter into a written agreement with George Milne for three years, with the privilege of extending the agreement for an additional period of seven years, Mr. Milne to furnish three rearing ponds and the department to pay him with 25,000 fry each year for the use of these ponds and his services, each party to the agreement to feed his own fish.

Mr. MacDonald reported that construction work in the Valley Garden ditch,

## The Toreador of the Tall Timber



**D**URING the closed season when the deer realize that they are protected, they venture to ranger stations and homes of Montana farmers, but this ranger is playing with a dangerous pet equipped with a set of antlers that might cause torn trousers in a tussle. The picture was taken in the Big Fork district.





in the Madison, near Ennis, for the installation of the fish screen, has been completed, and the fish screen is almost ready for installation.

He reported that spawning operations had to be discontinued at Lake Mary Ronan, where only three and a quarter million fish were taken; and that at Lake Francis, where only 200,000 fish have been taken, conditions are unsatisfactory because of water shortage.

Mr. Hendricks reported that 2,900 birds have been hatched at the game farm to date, with 7,000 eggs under incubation, and about 300 eggs or better are being taken daily.

Chairman Marlowe advised that other states are investigating the kinds of grain that can be put out by sportsmen and state departments for game bird and animal winter feedings, and suggested that the commission co-operate with the State Agricultural College in carrying on such experiments in this state, so that knowledge could be gained as to what kinds of feed to use. The chairman was authorized to take up this matter with the State Agricultural College at Bozeman, asking them to make a study of this proposition, and beginning next year, have them plant this feed, carry on the experiment and report the results of their investigations.

Mr. Marlowe presented a letter from the Acting Commissioner of the Bureau of Fisheries, advising that because of the shortage of cars, they will be unable to let the department have a fish car to carry on the distribution work this year from the Miles City Pond Cultural Station, and asking that the state make its own distribution. They will handle the collection work, as in the past, and will turn the fish over to the department at the station. Mr. Marlowe was authorized to notify them that this department will undertake this distribution.

Mr. Marlowe read a letter from G. T. Boyd in reply to his letter thanking Mr. Boyd for his good work while a commissioner.

Mr. Marlowe presented to the commission an assignment, properly executed, for the lease which M. L. Matzick had for the cabin at Ashley lake, in Flathead county.

Mr. Marlowe advised that at the request of the commission at their last meeting he had taken up with the sportsmen in Mineral county their views relative to an open season for elk in that county. A petition had been received from a few residents of Lolo Hot Springs, protesting the open season on elk in Mineral county, which had been created by the legislature. Mr. Marlowe advised that the sportsmen in Mineral county are much in favor of the open season. No action was taken on the petition.

Mr. Marlowe advised that Hoyt creek in Powell county, which was closed to fishing by order of the commission in 1921, is full of native trout which get into the stream from the Ovando hatchery. It is also full of brook trout, and the natives become food for the brook trout. He recommended opening this stream, and allowing the sportsmen to

## Walton League Leader In State



Jim Hammond

ited numerous clubs of sportsmen and civic leaders in the state, the spawning-taking stations, hatcheries, the game farm and other fish and game activities.

Jim Hammond was born in picturesque Oregon. He acquired a love for nature and its kindred phases of recreation during early childhood. It has been his pleasure to fish in famous salmon streams of the west and hunt in mountain regions of the Pacific coast for many years. He toured extensively in Europe and gathered valuable data on conservation methods abroad. For several years he served as assistant secretary of Rotary International on the Chicago headquarters staff, in charge of community service.

Mr. Hammond is an eloquent speaker and captivates his audience with his genial personality. He understands the meaning of conservation and its importance to the welfare of the public generally. His personal experience in the outdoors covers practically all phases of sport. Fishing, hunting, riding, hiking, camping and touring have long been a part of Jim Hammond's life. He is an ardent conservationist and puts to practical use the ideals of the Izaak Walton League of America.

Mr. Hammond is a brother of Major General Creed C. Hammond, former chief of the Militia Bureau of the United States, Washington, D. C., recently appointed as auditor-general of the Philippines by President Herbert Hoover.

benefit thereby. Sportsmen in this district have recommended such action. The order was made that the action of the commission, closing Hoyt creek, in Powell county, flowing through the SW $\frac{1}{4}$ , Sec. 33, T. 13 N., R. 12 W., near the Ovando hatchery, be rescinded, and that this stream be open to fishing during the regular open season of each year.

Reports were received from the Secretary of the Somers Rod and Gun

Club, suggesting certain sites for rearing ponds, and Mr. Marlowe was authorized to go to Somers and vicinity to inspect these proposed sites, and report to the commission.

Mr. Marlowe read a letter from Deputy Krost, giving a report of game and fish conditions in his territory.

William Carpenter, president of the Butte Anglers' Club, reported stream pollution in Mill creek, from tailings from the Smuggley mines, near Sheridan. Mr. Hill advised that, under the law, the commission is given no power to remedy such situations.

Discussion followed as to the re-employment of Paul J. Fair, and the question whether the department would be financially able to re-employ him as moving picture photographer at this time. Mr. Marlowe suggested that a bird hunting reel, a fishing reel, a duck hunting reel, and a reel of goats, bear, whitetail deer and warm water fishes should be made. Mr. Fair made a proposition that he would make these films, furnish the film and develop them, finish the reels completely and charge the commission \$1 per foot. He reported that he has taken several completed reels up to the present time, and that he has some films on hand which have not been used in these reels, which are the property of the department. He stated that to complete the new reels would approximate the use of 4,000 feet of film. Chairman Marlowe requested a small amount of additional work on the fishing reel which would require about 300 feet of film, and the elimination of a few scenes in the elk reel. The splendid response which the films are receiving was discussed. Mr. Fair suggested to the commission that possibly some coast company would consider the films already finished for synchronization and showing in their theaters, which would bring revenue to the department, as well as advertise Montana. It was suggested that Mr. Fair look into this proposition with a view to having this work done.

In view of the financial conditions at the present time, it was ordered that Mr. Fair be employed to revise the pictures showing spawning operations at Georgetown, at a cost not to exceed \$500. The commission complimented Mr. Fair on his work and expressed the hope that more reels can be taken in the future.

## JOHNNY APPLE SEED!

There are no doubt those who recall old "Johnny Apple Seed," that character in Ohio's history who many years ago earned his peculiar name by his equally peculiar habit of scattering apple seeds along the roadsides and tramping them under ground with his heel. We need some "Johnny Apple Seeds" in Montana. But we don't want them merely to plant apple seeds, but to take a pocketful of white clover or other seed with them when they go a fishin' or a huntin' and scatter them in likely places to provide future food for game. Like the apple seeds, not all of the clover or sumac will grow, but the seeds that do not germinate will be eaten by the birds and rodents.



## Jerked Venison Is Dangerous Diet

By William M. Rush, in Charge of Elk Study in Yellowstone National Park



W. M. Rush

**D**EER in the Yellowstone Park region are infested with encysted larvae of the dog tapeworm, according to findings of scientists who have examined numerous specimens, hence a warning is justified against eating uncooked deer meat, including dried and smoked venison, as it is possible that the encysted larvae in the muscles of the deer would develop into adult tapeworms in humans as well as in dogs and coyotes.

A number of the Yellowstone Park deer came to the winter range last fall in poor physical condition. Provisions were made for feeding hay and cottonseed cake at Mammoth, and 28 deer were fed here regularly during the severe part of the winter.

As early as January 3, two fawns showed symptoms of heavy intestinal worm infestation, and powdered tobacco was mixed with the cottonseed cake as a remedy. The animals ate the remedy readily but as the symptoms were not abated one fawn was killed on January 26 and it was found to be heavily infested with tapeworms of the genus *Moniezia*.

On January 27 one fawn was captured, placed in confinement, fasted for 12 hours and given 120 grains of powdered areca nut in five capsules. A domestic sheep-mouth spreader and capsule forceps were used in administering the drug. After another period of 12 hours this fawn was marked and released. On January 31 two fawns and on February 6 three fawns were similarly treated. One fawn was given a double dose of the medicine through mistake but showed no ill after-effects.

March 27 a fecal examination was made of one treated fawn and one untreated one, using the "salt flotation" method. No ova were found in the feces from the treated fawn. Ova of one of the round intestinal worms was found in the feces of the untreated fawn. Eight additional fecal examinations were made of five treated fawns, and three untreated does.

In the feces of one treated fawn one ovum of the tapeworm was found which would indicate that the treatment was not effective in this case. Segments of tapeworms were found in the feces of one untreated doe, the remainder of the samples being negative.

While this experiment of treating juvenile deer for teniasis gave no conclusive results as to the effective-

### Mail Your Dollar for Wild Life

**F**OLLOWING an appeal to members of Sportsmen's clubs throughout the state, asking that they co-operate in making MONTANA WILD LIFE the sort of magazine they desire, hunters and anglers are responding in a gratifying manner by mailing their dollar for 12 monthly copies. If you have overlooked sending in your subscription, **DO IT NOW.** Sincere efforts are being made to place before Montana sportsmen a comprehensive monthly review of activities of the State Fish and Game Department. Every Montana resident owes it to himself to keep in touch with this constructive program by reading MONTANA WILD LIFE.

the dog tapeworm justifies a warning against eating uncooked deer meat, including dried and smoked venison, as it is possible that the encysted larvae in the muscles of the deer would develop into adult tapeworms in humans as well as in dogs and coyotes.

Larvae of another dog tapeworm (*Cysticercus pisiformis*) were also found in the jackrabbits of this region.

### Black Bass For Montana Lakes

**H**IS Majesty, the Black Bass, is soon due to occupy a pedestal of esteem among Montana anglers who now deem the fighting rainbow the gamey rival of the fisherman, if plans of the State Fish and Game Department materialize. Under direction of fish experts of the department, 1,940 adult bass have been seined from Nine Pipe reservoir near Missoula and transplanted to smaller lakes and potholes where they will thrive naturally where food is plentiful. The bass were transplanted just before they were ready to spawn.

At the great warm water pond cultural station at Fort Keogh, near Miles City, one of the largest of its kind in the nation, bass, pike, catfish and similar warm water fish are permitted to spawn naturally and the fingerlings then transplanted. A shipment of 350 adult bass ready to spawn was sent to the Fort Keogh pond from Nine Pipe reservoir to serve as brood stock. Others will be planted in Lake Como near Hamilton and the Clearwater lakes in the Blackfoot area.

Perch are being seined from Jones lake near Ovando and distributed in the state for the benefit of the youngsters who wad up a piece of dough and pull 'em out. Many have been planted in Lake Helena and in the Missouri river near Cascade.

## SERVING---

118 Montana Cities and Towns

## THE MONTANA POWER CO.



# MONTANA WILD LIFE



## Poison Ivy

**P**OISON IVY, to some unfortunate persons, is the bane of the good old summertime; to others more fortunate, it is simply another weed. Some people are so susceptible to its blistering venom that immediate contact with the plant is not necessary in order to bring on a case of poisoning; merely stopping in the vicinity of a patch of it will cause infection. Exceptional cases have been known where cases have developed in the wintertime, simply from handling firewood that had been cut and piled where this plant was plentiful. On the other hand, there are many persons who can pluck and handle it with bare hands with no apparent poisoning—they are fortunate indeed.

Many remedies and preventatives have been advocated and used; some are excellent with some people and useless with others, some are successful under certain circumstances, and without avail under others. There is one unailing preventative—learn to recognize the plant immediately and when you see it, keep away from it. It is easily recognized by the observant—there is no other plant with which it should be confused by an observing individual, although many persons do not distinguish between it and the innocuous common woodbine.

Poison ivy is a low growing vine-like perennial plant that seems to prefer a sandy soil, although not confined to such a soil entirely. It grows most commonly and profusely on sandy roadside and lakeside banks, frequently on open ground bordering woods, and occasionally in open woods. It seldom grows to a height of over 18 inches, usually sprawling over the ground, and covering it with its shiny, bright green foliage. The shiny green may sometimes be dulled by a coating of dust, or by a dry spell of weather.

The leaflets are always three in number, as contrasted with the five of the woodbine; the edges are comparatively even, except for an occasional indentation, whereas the leaves of the woodbine are very ragged and saw edged. The last year's stem growth is short and woody, light brown in color—the new growth a bright green.

It is well to carefully inspect the summer houses, campsites, and temporary camping spots for patches of this disagreeable weed. In the case of summer homes and permanent campsites every vestige of poison ivy should be grubbed out and exterminated—one thorough cleaning will not get it all

as it increases by means of underground runners very similar to quack grass, and several sessions with the grubhoe are necessary before it will be entirely eradicated. Even if it has grown in the vicinity of your camp for many seasons without any annoyance, you may have visitors who will be most thoroughly poisoned by what has been considered a weed of no moment.

There is some confusion between the terms "poison ivy," "poison oak," and "poison sumac." The latter two apply to a member of the sumac family which sometimes grows to a height of 15 or 20 feet, and is almost invariably found growing in swampy forest lands, whereas our common sumac seldom grows on anything but dry land. The red upright fruit cluster of the ordinary sumac is well known; the fruit of the poison sumac is waxy white and drooping. This shrub should be avoided as much as poison ivy; its habit of growth in marshy, swampy lands tends to keep accidental contact with it reduced to a minimum compared to the prevalence of poison ivy.

There is no universal remedy for poison ivy inflammation; a solution of lead acetate or "sugar of lead," is most commonly used to allay the inflammation—the best cure is to know it and keep away from it.

## Clubs Line Up In Predatory Race

**E**IGHT clubs of Montana sportsmen have signified their intention of competing for the \$500 in prizes offered by the State Fish and Game Department in the annual predatory bird and animal campaign. The list is still open and other clubs desiring to compete are urged to communicate with the department for information and literature. Clubs already in the running are those at Augusta, Laurel, Plentywood, Medicine Lake, Glendive, Babb, Helena, and the Sidney Rifle club. Cash prizes will be paid to clubs securing the largest number of points in the killing of common enemies of wild life of the state.

### NO SELECTION

Desk Sergeant: "Guilty or not guilty?"  
Burglar: "What else have you?"

## A Shocking Story

**S**NOOPING bears don't care much for electric shocks, according to Alfred H. Povah, Yellowstone Park naturalist, who writes the following comment in Nature Notes from the park:

"The men from the fish hatchery had made all preparations for a record haul of eggs. The traps were placed in the most advantageous spots in a number of creeks and all that remained was to await the run of the trout. In Big Thumb creek, where a good catch was usually made, although the creek showed many fish on their way to the spawning ground, the trap was empty. A few eggs scattered along the creek bottom just below the trap told the story—bears.

"A bear may be cunning but two can play at any game. A means must be devised to save the fish and thus assure a plentiful supply of eggs. The trap was enclosed in a fence of wire screening about three feet high. Inside this and about one inch distant was strung a single strand of heavy copper wire. This was connected with two large storage batteries, hidden in a box near by, in such a way that when the wire screening was pushed against the copper wire an electric contact was made. The fact that the animal, in reaching the trap, had to stand in water, assured an outlet for the electric current through the animal.

"No witnesses were present to record the astonishment of the first fish-hungry bear but the success of this method of protecting the spawning trout was shown by the fact that the week after the electric shock-dealing apparatus was installed the trap was full of fish when the men from the hatchery came to collect the eggs. I have heard the use of a similar silent guard suggested for garbage pails in the park."

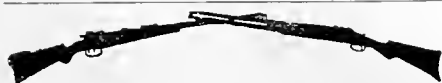
### NOT ANY, THANKS!

Office Boy—There's a salesman outside with a mustache.

Executive—Tell him I've got a mustache.

Clerk: "And you get an extra pair of pants with this suit."

Scotchman: "Throw in an extra coat and I'll take it."



### RIFLES REMODELED

Springfield and Krag remodeled into sporting rifles, \$5.00 to \$10.00. Ammunition, 30-06, \$2.50; 30-40 Krag, \$3.50 per 100 rounds.

T. W. HILDEMAN  
Kenwood Helena

## SPORTSMEN ---

Recognize this as Headquarters for All Hunting, Fishing and Camping Equipment

## THE MONTANA HARDWARE

Department of Anaconda Copper Mining Company, Butte, Montana



# MONTANA WILD LIFE



## Montana Sportsmen's Association

### MEETINGS OF SPORTSMEN

**B.** F. GERRY, educational secretary of the department, attended the following meetings and spoke on work being done by the Montana State Fish and Game Department in an effort to perpetuate Montana's wild life resources. The need of co-operation among sportsmen's clubs with the department and the Montana Sportsmen's Association was stressed. Several new clubs were started and some were re-organized during May. Practically all the clubs in the state are carrying on more activities than at any time in the past and more fully realize the need of organization and co-operation.

April 27, Livingston—Pictures of fish and game taken by the department photographer were shown to 1,400 pupils and adults in the afternoon. At a joint meeting of the Kiwanis, Rotary and Commercial clubs held in the evening, pictures were shown to 40 members and plans were made for the forming of a sportsman's club.

April 30, Libby—Three hundred pupils enjoyed the pictures in the afternoon and 125 attended the evening meeting. Libby has one of the most active clubs in the state and many Sportsmen's licenses have been sold there. The new state fish hatchery located near Libby is one of the finest in the state. The Libby club has released many elk in the territory.

May 6, White Sulphur Springs—At a meeting held in the afternoon, attended by 300, plans were made for a new sportsmen's club. The territory offers many problems.

May 7, Lewistown—About 300, including pupils and adults, enjoyed the pictures in the evening. The Lewistown club has always been active in the control and destruction of predatory birds and animals. The club has been co-operating with the city in beautifying the grounds around the state fish hatchery.

May 8, Havre—Pictures were shown to 1,000 in the evening. Sportsmen of that territory are showing a great deal of interest and are taking advantage of every opportunity to build up the wild life resources of Hill county.

May 12, Glasgow—A crowd of 1,100 enjoyed a musical program and the pictures in the evening. The Glasgow club is interested in the perpetuation of migratory waterfowl.

May 13, Poplar—Five hundred pupils and adults enjoyed the pictures in the afternoon and evening. Being on the Fort Peck Indian reservation, the sportsmen of that territory have many problems to work on.

May 14, Sidney—The pictures were shown to 325 pupils in the afternoon. The evening meeting was held in the court house and sportsmen from Sidney and nearby towns met after the program and made plans for a county sportsman's club.

### Sportsman Packs Fish to Ponds

**Z**EAL of Montana sportsmen in stocking streams and doing everything within their power to maintain the game and fish supply against the constantly increasing inroads of civilization, is again demonstrated in the following letter from A. C. Baumgartner of Great Falls:

"I have read the letter of Hi Larsen in the June issue of MONTANA WILD LIFE in regard to packing fish on the back to mountain lakes.

"In the summer of 1929 I built a cabin under the falls on Lick creek in the flats of Wood creek 4 1/2 miles from Benchmark in the Lewis and Clark forest. I found seven beaver dams above the falls of Lick creek with no fish in them. I cut the top out of a five-gallon oil can and put a wire bail on it, took my flyrod and went up Wood creek and caught eight Eastern Brook trout from 7 to 12 inches in length. These I placed in the oil can and packed one mile to my cabin where I put them in a small pond. I made five trips that way and by night had 40 trout in the pond at the cabin.

"The next morning I packed these fish on my back over the hill a half mile to the beaver dams on Lick creek and planted them.

"Last fall I took a trip to the dams to see how they were doing and found plenty of fish there, some of them as large as 2 1/2 pounds.

"It is a hobby of mine to plant fish in any stream or pond where they will live and I am glad to see that other people are doing the same thing."

May 15, Bainville—Two hundred pupils enjoyed the pictures in the afternoon and they were shown at the theater in the evening to nearly 400. The sportsmen there are to be congratulated upon their club, better known as the Fish House Gang. About 20 attended a meeting after the evening program.

May 16, Scobey—The pictures were shown in the theater in the afternoon to 425 pupils and adults and again in the evening to about 150. An effort is being made to reorganize the club at Scobey.

May 18, Redstone—Regardless of weather more than 200 came in to see the pictures in the evening and a good meeting was held after the program. The club has a membership of 24 and an effort is being made to increase it to 50 this year.

May 19, Plentywood—The pictures were shown to 450 in the afternoon and 600 enjoyed the High School band

concert and pictures in the evening. Many of those attending drove more than 50 miles.

May 20, Glendive—The educational secretary spoke on Montana's wild life resources at the Kiwanis meeting at noon. In the evening the pictures were shown to 800. The Dawson County Rod and Gun Club is very active and the merchants of Glendive have put up many prizes for the predatory bird and animal contest.

May 21, Miles City—Pictures were shown to 300 in the evening at the Elks' Club. The club is not overlooking anything that will better hunting and fishing conditions in that territory.

May 22, Forsyth—The pictures were shown to 400 pupils in the afternoon and to 200 adults in the evening. The Forsyth club has an unusually large membership this year and is headed by Judge Freeman, one of the most ardent sportsmen in Montana.

May 23, Hardin—The educational secretary attended the meeting of the Southeastern Montana Sportsmen's Association in the afternoon and pictures were shown to 150 in the evening.

### DEER INCREASING

**S**PORTSMEN of northeastern Montana assert that deer are increasing along the Missouri and Yellowstone river bottoms; also that quite a few are being killed each year by poachers.

### SCARCITY OF DUCKS

**D**UE to the drought the small lakes in the eastern part of the state are low for this time of year. Few ducks are nesting in that part of the state. At Bowdoin lake few ducks or nests were found and from indications northeastern Montana will not have its usual hatch of local ducks. The sportsmen in that territory are much opposed to the new federal law setting the opening date of the duck season Oct. 1 instead of Sept. 16. They feel that many of the local ducks will have left by Oct. 1, which will deprive them of one of their principal sports. The educational secretary spent several hours with Lars Angvick who lives near Reserve and represents Sheridan county in the senate. Mr. Angvick is an ardent sportsman interested in wild life conditions in northeastern Montana.

### CLUB MEMBERSHIPS

**M**ORE than 30 clubs have signified their willingness to affiliate with the Montana Sportsmen's Association for 1931 and from present indications about 45 will be affiliated before the end of the year. This number will increase the membership by 100%. There are many activities to be completed during the last six months of the year.